



**UNITED STATES DEPARTMENT OF COMMERCE
Patent and Trademark Office**

Address: COMMISSIONER OF PATENTS AND TRADEMARKS
Washington, D.C. 20231

BC8

TS.

| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. |
|-----------------|-------------|----------------------|---------------------|
|-----------------|-------------|----------------------|---------------------|

09/204,102

12/01/98

HOUN

H

NBX-007-6611

LM01/0815

EXAMINER

HARPER, K

JOHN JAMES MCGLEW
MCGLEW AND TUTTLE, PC
ONE SCARBOROUGH STATION PLAZA
SACRBOROUGH NY 10510-0827

ART UNIT

PAPER NUMBER

2735

DATE MAILED:

08/15/00

Please find below and/or attached an Office communication concerning this application or proceeding.

Commissioner of Patents and Trademarks

Office Action Summary

Application No.

09/204,102

Applicant(s)

Houh et al.

Examiner

Kevin C. Harper

Group Art Unit

2735



☒ Responsive to communication(s) filed on Jun 28, 1900

☐ This action is **FINAL**.

☐ Since this application is in condition for allowance except for formal matters, **prosecution as to the merits is closed** in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

A shortened statutory period for response to this action is set to expire 3 month(s), or thirty days, whichever is longer, from the mailing date of this communication. Failure to respond within the period for response will cause the application to become abandoned. (35 U.S.C. § 133). Extensions of time may be obtained under the provisions of 37 CFR 1.136(a).

Disposition of Claims

☒ Claim(s) 1-14 is/are pending in the application.

Of the above, claim(s) _____ is/are withdrawn from consideration.

☐ Claim(s) _____ is/are allowed.

☒ Claim(s) 1-14 is/are rejected.

☐ Claim(s) _____ is/are objected to.

☐ Claims _____ are subject to restriction or election requirement.

Application Papers

☐ See the attached Notice of Draftsperson's Patent Drawing Review, PTO-948.

☒ The drawing(s) filed on Dec 1, 1998 is/are objected to by the Examiner.

☐ The proposed drawing correction, filed on _____ is ☐ approved ☐ disapproved.

☐ The specification is objected to by the Examiner.

☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. § 119

☐ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d).

☐ All ☐ Some* ☐ None of the CERTIFIED copies of the priority documents have been
☐ received.

☐ received in Application No. (Series Code/Serial Number) _____.

☐ received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

*Certified copies not received: _____

☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).

Attachment(s)

☐ Notice of References Cited, PTO-892

☐ Information Disclosure Statement(s), PTO-1449, Paper No(s). _____

☐ Interview Summary, PTO-413

☐ Notice of Draftsperson's Patent Drawing Review, PTO-948

☐ Notice of Informal Patent Application, PTO-152

— SEE OFFICE ACTION ON THE FOLLOWING PAGES —

Art Unit: 2735

Response to Arguments

1. Regarding claims 1-7, 9-10 and 12, applicant's arguments filed 6/28/00 have been fully considered but they are not persuasive. Applicant noted the differences between the present invention and the Markkula reference. Specifically, applicant argued that Markkula does not relate to forwarding a packet. The previous Office action stated in paragraph 1 that "the next packet to be sent is stored until an acknowledgment is received...." Markkula transmits a first packet and waits for an acknowledgment to be received before sending a second packet. In relation to claim 1, the "packet" as claimed is considered to be the second packet of Markkula, not the first packet. If within a given time period an acknowledgment is not received for the transmission of the first packet, the attempt to forward the second packet will be stopped and the first packet will be retransmitted. Hence, the attempt to forward the second packet will be canceled.
2. Accordingly, applicant's arguments fail to comply with 37 CFR 1.111(b) because they amount to a general allegation that the claims define a patentable invention without specifically pointing out how the language of the claims patentably distinguishes them from the references.
3. Applicant's arguments with respect to claims 8, 11 and 13 have been considered but are moot in view of the new ground(s) of rejection.

Art Unit: 2735

Drawings

4. The drawings are objected to because Figure 2, item 20, Figure 3, items 10, 62 and 63, Figure 4, items 10' and 63', and Figure 5, item 24 require descriptive wording. Correction is required.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1-7 and 9-10 are rejected under 35 U.S.C. 102(b) as being anticipated by Markkula, Jr. et al. (US 4,918,690).

5. Regarding claims 1-2 and 5-6, Markkula discloses a method for forwarding packets to a network (abstract, lines 1-2) comprising the steps of attempting to forward a packet stored in memory (Figure 12) to the network (col. 71, lines 60-61; note: one skilled in the art recognizes that in connection-oriented communication using an ARQ protocol, the next packet to be sent is stored until an acknowledgment is received for the preceding packet), establishing a time limit within which to forward the packet stored in the memory to the network (col. 71, lines 61-62), monitoring an elapsed period of time while attempting to forward the packet stored in memory to the network (col. 71, lines 61-62), and determining whether to cancel attempt to forward the

Art Unit: 2735

packet stored in the memory when the elapsed period of time has expired (col. 71, lines 63-64; note: the previous packet is transmitted again and the timer is reset, instead of the current packet being transmitted when the timer expires).

6. Regarding claim 3, if the previous packet is successfully transmitted then the current packet may be transmitted without interruption (col. 77, lines 8-10).

7. Regarding claim 4, a transmitted message can be interrupted while it is being transmitted (col. 77, lines 8-10).

8. Regarding claim 7, if the previous packet is successfully transmitted and the current packet needs to be retransmitted, then a retransmission bit is changed to designate the packet as a retransmission (col. 72, lines 35-38).

9. Regarding claims 9 and 10, if the previous packet is successfully transmitted and the current packet does not transmit successfully, an ACK timer will be restarted (col. 14, lines 24-26) and the packet will be transmitted again (col. 71, lines 60-64).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Art Unit: 2735

Claim 8 and 11-14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Markkula, Jr. et al. (US 4,918,690).

10. Regarding claims 8, 11 and 13-14, Markkula does not disclose transmitting time-sensitive data. One skilled in the art would recognize that the type of data transmitted depends on the source of the transmission to the network. Therefore, it would have been obvious to one skilled in the art at the time the invention was made to have time-sensitive data in the invention of Markkula as a matter of network design choice to allow connectivity of time-sensitive devices such as telephones, as evidenced by its commonality. Further, if the previous packet is successfully transmitted and the current packet needs to be retransmitted, the protocol related data only (Figure 6, contention timer) is changed (col. 14, lines 24-26).

11. Regarding claim 12, Markkula discloses a method of transmitting packets to a network. However, Markkula does not disclose having a new packet with different time-sensitive data and the same protocol-related data as a replaced packet. One skilled in the art would recognize that a selective ARQ protocol allows the retransmission of unacknowledged packets out of sequence. In this case, a replacement packet will be addressed to the same destination but have a different data payload. Therefore, it would have been obvious to one skilled in the art at the time the invention was made to have a selective ARQ in the invention of Markkula because Markkula discloses a method of forwarding packets which determines if a packet should be retransmitted and one skilled in the art would recognize that a selective ARQ protocol would allow the efficient

Art Unit: 2735

transmission of non-real time data (i.e. not voice or video packets) by allowing succeeding packets to be transmitted without waiting for an acknowledgment for a packet.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kevin Harper whose telephone number is (703) 305-0139. The examiner can normally be reached on Monday-Tuesday and Thursday-Friday from 7:30 AM to 6:00 PM EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Horabik, can be reached at (703) 305-4704. The fax phone number for this Group is (703) 305-3988.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Group receptionist whose telephone number is (703) 305-3800.

Kevin C. Harper



August 8, 2000



**HUY D. VU
PRIMARY EXAMINER**